



# United States Patent and Trademark Office

UNITED STATES DEPARTMENT OF COMMERCE United States Patent and Trademark Office Address: COMMISSIONER FOR PATENTS P.O. Box 1450 Alexandria, Virginia 22313-1450 www.uspto.gov

APPLICATION NO.	FII	LING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/885,186	0	06/20/2001	Kimmo Kinnunen	413-010355-US(PAR)	4625
2512	7590	06/12/2006		EXAM	INER
PERMAN .		1	FOX, BRYAN J		
425 POST ROAD FAIRFIELD, CT 06824			ART UNIT	PAPER NUMBER	
	, 01 000			2617	

DATE MAILED: 06/12/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

	Application No.	Applicant(s)
	09/885,186	KINNUNEN ET AL.
Office Action Summary	Examiner	Art Unit
	Bryan J. Fox	2617
The MAILING DATE of this communication  Period for Reply	on app ars on the cover shet w	vith the correspondence address
A SHORTENED STATUTORY PERIOD FOR F WHICHEVER IS LONGER, FROM THE MAILII  - Extensions of time may be available under the provisions of 37 of after SIX (6) MONTHS from the mailing date of this communicat  - If NO period for reply is specified above, the maximum statutory  - Failure to reply within the set or extended period for reply will, by Any reply received by the Office later than three months after the earned patent term adjustment. See 37 CFR 1.704(b).	NG DATE OF THIS COMMUN CFR 1.136(a). In no event, however, may a tion. period will apply and will expire SIX (6) MC y statute, cause the application to become b	ICATION. In reply be timely filed  DNTHS from the mailing date of this communication.  ABANDONED (35 U.S.C. § 133).
Status		
<ul> <li>1) Responsive to communication(s) filed on</li> <li>2a) This action is FINAL.</li> <li>2b) Since this application is in condition for a closed in accordance with the practice un</li> </ul>	This action is non-final. Illowance except for formal ma	
Disposition of Claims		
4) ⊠ Claim(s) 3-11,13 and 15-20 is/are pendir 4a) Of the above claim(s) is/are wi 5) □ Claim(s) is/are allowed. 6) ⊠ Claim(s) 3-11,13 and 15-20 is/are rejected 7) □ Claim(s) is/are objected to. 8) □ Claim(s) are subject to restriction  Application Papers	ithdrawn from consideration. ed.	
9) The specification is objected to by the Ex	aminer.	
10) The drawing(s) filed on is/are: a) Applicant may not request that any objection Replacement drawing sheet(s) including the 11) The oath or declaration is objected to by	accepted or b) objected to the drawing(s) be held in abeyon correction is required if the drawing	ance. See 37 CFR 1.85(a).  g(s) is objected to. See 37 CFR 1.121(d).
Priority under 35 U.S.C. § 119		
12) Acknowledgment is made of a claim for for a) All b) Some * c) None of:  1. Certified copies of the priority docu 2. Certified copies of the priority docu 3. Copies of the certified copies of the application from the International E * See the attached detailed Office action for	uments have been received. uments have been received in e priority documents have bee Bureau (PCT Rule 17.2(a)).	Application No In received in this National Stage
Attachment(s)  1) Notice of References Cited (PTO-892)  2) Notice of Draftsperson's Patent Drawing Review (PTO-9  3) Information Disclosure Statement(s) (PTO-1449 or PTO/Paper No(s)/Mail Date	48) Paper No	v Summary (PTO-413) o(s)/Mail Date f Informal Patent Application (PTO-152) 

Art Unit: 2617

### **DETAILED ACTION**

The Art Unit location of your application in the USPTO has changed. To aid in correlating any papers for this application, all further correspondence regarding this application should be directed to Art Unit 2617.

### Continued Examination Under 37 CFR 1.114

A request for continued examination under 37 CFR 1.114, including the fee set forth in 37 CFR 1.17(e), was filed in this application after final rejection. Since this application is eligible for continued examination under 37 CFR 1.114, and the fee set forth in 37 CFR 1.17(e) has been timely paid, the finality of the previous Office action has been withdrawn pursuant to 37 CFR 1.114. Applicant's submission filed on March 29, 2006 has been entered.

## Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

The text of those sections of Title 35, U.S. Code not included in this action can be found in a prior Office action.

Claims 3-6, 15, 17 and 20 are rejected under 35 U.S.C. 103(a) as being unpatentable over Prior et al (EP000913977A2) in view of Takafumi (JP11284706), and further in view of Vandiver (US005610971A).

Regarding **claim 20**, Prior, et al discloses a radiotelephone handset with a keypad 7, which reads on the claimed "keypad", a display 3, which reads on the claimed

"display", a microphone 6, which reads on the claimed "microphone" and an earpiece 5, which reads on the claimed "speaker" all located on the front of the shell and together read on the claimed "first functional elements placed on a front surface of the shell" (see figure 1). An on/off button 4 is located on the upper end of the shell and more keys are located on the side of the phone as can be seen in figure 2, which read on the claimed "second functional elements placed on an upper or side surfaces of the shell, wherein said second functional elements comprise various function keys". In figure 3, it can be seen that keys 25 and 26 are located on the rear of the phone, which read on the claimed "third functional elements placed on a rear surface of the shell of the shell". Prior, et al further discloses in column 5, lines 34-35 and in figure six an alternative user interface on the rear of the handset, which reads on the claimed "wherein said first and second functional elements cooperate to provide a first user interface for normal use of the radio telephone, and said third and second function elements cooperate to provide a second user interface for use when said first functional elements are obstructed, and wherein said first user and said second user interface operate independently," wherein the functions on the back may be used without any use of the functions in the front of the phone and therefore are independent. Prior et al fails to disclose a speaker and a microphone on the back of the telephone.

In a similar field of endeavor, Takafumi discloses a portable telephone set with a speaker 4 and a microphone 6 placed on the opposite side of the display 2 and the operation section 3 (see "SOLUTION" section), which reads on the claimed "rear speaker and a rear microphone".

Art Unit: 2617

It would have been obvious to a person of ordinary skill in the art at the time of the invention to modify Prior et al with Takafumi to include the above rear speaker and rear microphone in order to enhance the operability of a key operation section of the portable telephone set as suggested by Takafumi (see "PROBLEM TO BE SOLVED" section). The combination of Prior et al and Takafumi fails to disclose the use of two microphone and two speakers as claimed.

In a similar field of endeavor, Vandiver discloses a cellular phone system that has two complete interfaces, including two microphones and two speakers (see column 2. lines 1-31 and figures 1-3).

It would have been obvious to a person of ordinary skill in the art at the time of the invention to modify the combination of Prior et al and Takafumi to include the above use of two microphone and two speakers in order to achieve convenient operation in both hand-held and hands-free operation as suggested by Vindiver (see column 1, lines 12-45).

Regarding **claim 3**, the combination of Prior et al, Takafumi and Vandiver discloses in Prior column 1, lines 7-10 that important user interface considerations include the ease of which the phone can be transported (see Prior et al column 1, lines 7-10) and that the input means on the rear face of the handset, which reads on the claimed "third functional elements", promotes single handed operation (see Prior et al column 1, lines 30-31). It is clear that the phone is intended to be used while being carried in one hand, which reads on the claimed "carrying means".

Art Unit: 2617

Regarding claim 4, the combination of Prior et al, Takafumi and Vandiver discloses that a group may be selected by soft key 81 (see Prior et al column 7, lines 30-31), which reads on the claimed "group selector switch" and the soft key 81 is located on the rear of the phone (see Prior et al figure 8a), which reads on the claimed "third functional elements".

Regarding claim 5, the combination of Prior et al, Takafumi and Vandiver discloses an interface with actuable rolling means 111 which control the menu options on the display (see Prior et al figure 11 and column 9, lines 37-38), which reads on the claimed "rotary switch for selecting a group by turning the selector switch".

Regarding claim 6, the combination of Prior et al, Takafumi and Vandiver discloses that the soft key 81 can be depressed and as described above can be used to select a group (see Prior et al column 8, line 48), which reads on the claimed "pushbutton switch for selecting a group by pushing the selector switch".

Regarding claim 15, the combination of Prior et al, Takafumi and Vandiver discloses that the key 26 (see Prior et al figure 3) may have a dedicated function, such as a voice recognition function, which enables the user to store and retrieve data from the handset's memory (see Prior et al column 4, lines 54-57), which reads on the claimed "speech recognition button to use functions in the phone that can be controlled by the user's voice commands".

Regarding claim 17, the combination of Prior et al and Takafumi fails to disclose an automatic function for changing the speaker when the phone is in a carrying means and when the phone is not in the carrying means.

Art Unit: 2617

In a similar field of endeavor, Vandiver discloses a switch that automatically switches the interface when in a cradle versus when out of the cradle (see column 2, lines 31-62).

It would have been obvious to a person of ordinary skill in the art at the time of the invention to modify the combination of Prior et al and Takafumi with Vandiver to include the above use of an automatic switch to switch between modes in order to improve the convenience of the phone as suggested by Vandiver (see column 3, lines 9-15).

Claim 7 is rejected under 35 U.S.C. 103(a) as being unpatentable over Prior, et al in view of Takafumi and Vandiver as applied to claim 6 above, and further in view of Davidson, et al (US005841855A).

Regarding **claim 7**, the combination of Prior et al, Takafumi and Vandiver fails to disclose a key to select a previous group.

In a similar field of endeavor, Davidson, et al discloses a terminal with a back key 221 (see figure 3) and in column 4, lines 7-8 describes that its function is to allow a user to back up menu screen by menu screen, which reads on the claimed "pushing of the said group selector switch is arranged so as to select the previous selected group".

It would be obvious to one skilled in the art at the time of the invention to modify the combination of Prior et al, Takafumi and Vandiver to include the back button in Davidson, et al in order to create a more user-friendly and intuitive interface.

Art Unit: 2617

Claims 8-11 are rejected under 35 U.S.C. 103(a) as being unpatentable over the Prior, et al in view of Takafumi and Vandiver as applied to claim 4 above, and further in view of Bannister, et al (2012199).

Regarding **claim 8**, the combination of Prior et al, Takafumi and Vandiver fails to disclose a voice response function arranged in conjunction with the group selector switch to convey information to the user by means of a recorded voice message.

In a similar field of endeavor, Bannister, et al discloses an audible voice signal which may be included in the presenting means on page 10, lines 20-21, which reads on the claimed "voice response function arranged in conjunction with the group selector switch to convey information to the user by means of a recorded voice message".

It would have been obvious to a person of ordinary skill in the art at the time of the invention to modify the combination of Prior et al, Takafumi and Vandiver with Bannister, et al to include the above audible voice signal included in the presenting means in order to allow user operation without referring to the display panel as suggested by Bannister, et al (see page 10, lines 18-24).

Regarding **claim 9**, the combination of Prior et al, Takafumi and Vandiver fails to disclose that a group name or index is given in the said recorded voice message.

In a similar field of endeavor, Bannister, et al discloses on page 10, line 1 that selection of a soft key in one menu can cause another menu to be displayed. Each menu is a group and the soft key that selects the menu is a group selector switch.

Bannister, et al further discloses on lines 24-26 that the message is relayed as each soft

Art Unit: 2617

key is highlighted, which reads on the claimed "group name or index is given in the said recorded voice message".

It would be obvious to one skilled in the art at the time of the invention to modify the combination Prior et al, Takafumi and Vandiver with Bannister, et al to include the above message function in order to in prevent the need for a user to divert his attention to a display when in a situation such as driving a car.

Regarding **claim 10**, the combination of Prior et al, Takafumi and Vandiver fails to expressly disclose a delay between the voice message and the transition to the group.

In a similar field of endeavor, Bannister, et al discloses that the function of the softkey is read off as it is highlighted, after which it may be selected and the new menu is displayed (see Bannister et al page 10, lines 24-26). Therefore, there must be a delay between the message and the transition to the group as claimed.

It would have been obvious to a person of ordinary skill in the art at the time of the invention to modify the combination of Prior et al, Takafumi and Vandiver with Bannister to include the above transition delay in order to allow a user to best take advantage of the function of a softkey with announcements.

Regarding **claim 11**, the combination of Prior et al, Takafumi and Vandiver fails to expressly disclose a recorded voice message that gives confirmation of the selection of a group.

In a similar field of endeavor, Bannister, et al discloses that as each soft key is highlighted it can be read to the user by a voice synthesizer (see Bannister et al page

Art Unit: 2617

10, lines 24-26), so as each group, represented by a soft key, is selected, or

highlighted, the voice synthesizer reads the name to confirm selection, as claimed.

It would have been obvious to a person of ordinary skill in the art at the time of the invention to modify the combination of Prior et al, Takafumi and Vandiver with Bannister, et al to include the above voice synthesized read-off of a selected soft key in order to allow user operation without referring to the display panel as suggested by Bannister, et al (see page 10, lines 18-24).

Claim 13 is rejected under 35 U.S.C. 103(a) as being unpatentable over Prior, et al in view of Takafumi and Vandiver as applied to claim 1 above, and further in view of Gordon (US005884156A).

Regarding **claim 13**, the combination of Prior et al, Takafumi and Vandiver fails to disclose that the phone could function as a direct channel radio.

In a similar field of endeavor, Gordon discloses in column 1, lines 7-8 that his device could provide communications in a telephony mode, which reads on the claimed "systems radio", and in a radio dispatch mode, which reads on the claimed "direct channel radio".

It would be obvious to one skilled in the art at the time of the invention to modify the combination of Prior et al, Takafumi and Vandiver to include the above radio dispatch mode disclosed by Gordon in order to eliminate the need for two separate devices and reuse some of the common circuitry.

Art Unit: 2617

Claim 16 is rejected under 35 U.S.C. 103(a) as being unpatentable over Prior, et al in view of Takafumi and Vandiver as applied to claim 1 above, and further in view of Fishman (US005655017A).

Regarding **claim 16**, the combination of Prior et al, Takafumi and Vandiver fails to disclose a selection switch to choose the speaker.

In a similar field of endeavor, Fishman discloses a phone with a normal speaker 20 and an additional speaker 26 in the rear (see figure 1) and that a separate switch can be provided to turn the speakerphone on and off (see column 3, lines 49-51), which reads on the claimed "selection switch for setting the incoming voice messages to be reproduced by the speaker or the rear speaker".

It would be obvious to one skilled in the art at the time of the invention to modify the combination of Prior et al, Takafumi and Vandiver with Fishman to include a switch to choose which speaker is used in order to allow a user to customize the unit to function according to his preferences.

Claims 18 and 19 are rejected under 35 U.S.C. 103(a) as being unpatentable over Prior et al in view of Takafumi and Vandiver as applied to claim 20 above, and further in view of what is old and well known in the art.

Regarding **claim 18**, the combination of Prior et al, Takafumi and Vandiver fails to expressly disclose that the phone may be used by a governmental authority.

The examiner takes official notice that phones used by governmental authorities were well known at the time of the invention and it would have been obvious to a person

of ordinary skill in the art at the time of the invention to modify the combination of Prior et al. Takafumi and Vandiver such that governmental authorities may use the phone.

Regarding **claim 19**, the combination of Prior et al, Takafumi and Vandiver fails to expressly disclose that the phone may be used by civilians.

The examiner takes official notice that phones used by governmental authorities were well known at the time of the invention and it would have been obvious to a person of ordinary skill in the art at the time of the invention to modify the combination of Prior et al, Takafumi and Vandiver such that civilians may use the phone.

## Response to Arguments

Applicant's arguments with respect to claims 3-11, 13 and 15-20 have been considered but are most in view of the new ground(s) of rejection.

## Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Bryan J. Fox whose telephone number is (571) 272-7908. The examiner can normally be reached on Monday through Friday 9-5.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Joseph Feild can be reached on (571) 272-4090. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Application/Control Number: 09/885,186 Page 12

Art Unit: 2617

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

Bryan Fox June 2, 2006

TEMICA BEAMER
PRIMARY EXAMINER